

IN THE CLAIMS

This listing of the claim will replace all prior versions and listings of claim in the present application.

Listing of Claims

1. (currently amended) A method of production planning, in a production planning system, for calculating out at least one management index related with production activity amount and/or supply amount and/or transportation means at a plural number of points of production, material supply and/or transportation to a marketing point at a plurality of production points, material supply and/or marketing, said production planning system, upon implementing said production planning method, performs the, comprising steps of:

making a restriction condition for each of said at least one management index, formulated with an equation of $x = \text{a target value of each of said at least one management index} + \text{a plus estrangement value from said target value (a variable)} - \text{a minus estrangement value from said target value (a variable)}$, in which x is a real value of each of said at least management index, by inputting each of said at least one management index as a constant;

solving a linear programming problem in which said restriction condition is incorporated;

calculating a feasible real value x so that the estrangement between said target value of each of said management index, calculated from an executable solution of said linear programming problem, comes to be minimal; and

~~showing said real value x calculated, putting a relationship between a target value of a predetermined management index and an estrangement value therefrom into restriction condition, when formulating the restriction condition into a linear programming problem; and calculating out a feasible production plan, so that the estrangement between said predetermined management index and the target value thereof, being calculated from an executable solution of said linear programming problem, comes to be minimal.~~

2. (original) A method of production planning, as is defined in the claim 1, wherein said management index is a combination of at least one or more of inventory, profit, sales, cost, a rate of operation, fulfilling rate of demands from marketing point, cash which production activity produces, and an efficiency at which the production activity produces the cash.

3. (currently amended) A method of production planning, as is defined in the claim 1, wherein ~~the said~~ target value of each of said ~~the~~ management index is set to be equal to, greater or less than that, or maximal or minimal, with respect to a numerical value appointed.

4. (currently amended) A method of production planning, as is defined in the claim 1, wherein ~~the~~ production amount and/or material ~~the~~ supply amount and/or ~~the~~ transportation amount ~~means~~ is/are calculated out by repeating steps of:

setting ~~the said~~ target value of each of said ~~the~~ management index through an input means;_i

solving said linear programming problem in a calculation means;_i

displaying a result thereof on a display means, and again, changing said restriction condition stored in a memory means upon receipt of change in ~~the said~~ target value of each of said ~~the~~ management index through ~~the said~~ input means;_i
_____ solving ~~the said~~ linear programming problem, the restriction condition of which is changed, in ~~the said~~ calculation means;_i and
displaying the result thereof on ~~the said~~ display means.

5. (currently amended) A memory medium, storing program for executing said processes_i in the method of production planning, as defined in the claim 1.

Claim 6 (canceled).

7. (currently amended) A method of production planning, as defined in the claim 6₁, wherein ~~the said~~ linear programming problem is solved by adding at least one of management indices index to said ~~predetermined~~ management indices index, or by changing at least one of ~~sad~~ management indices index into another management index, or by changing at least one target value of said ~~predetermined~~ management indices index into another value, thereby calculating out values of the management indices after the addition or the change thereof.

8. (currently amended) A method of production planning, as defined in the claim 6~~1~~, wherein the said values of said ~~predetermined management indices~~ index ~~is~~ are displayed on a display means in a form of a radar chart or a rod graph.

9. (currently amended) A method of production planning, as defined in the claim 7~~1~~, wherein the ~~values of said predetermined management indices~~ index and the values of said ~~predetermined management indices~~ index after the addition or the change thereof are displayed on a display means in a form of a radar chart or a rod graph.

10. (currently amended) A method of production planning, as defined in the claim 7~~1~~, wherein the said target values of said ~~predetermined management indices~~ index and actual values of the said management ~~indices~~ index are displayed on a display means in a form of a radar chart or a rod graph.

Claim 11 (canceled).